

## EAST Search History

| Ref # | Hits   | Search Query  | DBs  | Default Operator | Plurals | Time Stamp       |
|-------|--------|---|--|------------------|---------|------------------|
| L2    | 184612 | (concentric\$5 or coaxial\$5) and (pipe or tube or conduit or passage\$3) and (valve or thrott\$3)  | US-PGPUB;<br>USPAT;<br>USOCR;<br>FPRS;<br>EPO; JPO                         | OR               | ON      | 2007/01/02 13:32 |
| L3    | 34543  | (concentric\$5 or coaxial\$5) and (pipe or tube or conduit or passage\$3) and (valve or thrott\$3) and (acoustic\$5 or noise or sound or pulsation or puls\$3)  | US-PGPUB;<br>USPAT;<br>USOCR;<br>FPRS;<br>EPO; JPO                         | OR               | ON      | 2007/01/02 13:36 |
| L4    | 18412  | ((concentric\$5 or coaxial\$5) same (pipe or tube or conduit or passage\$3)) and (valve or thrott\$3) and (acoustic\$5 or noise or sound or pulsation or puls\$3)   | US-PGPUB;<br>USPAT;<br>USOCR;<br>FPRS;<br>EPO; JPO                         | OR               | ON      | 2007/01/02 13:36 |
| L5    | 11341  | ((concentric\$5 or coaxial\$5) with (pipe or tube or conduit or passage\$3)) and (valve or thrott\$3) and (acoustic\$5 or noise or sound or pulsation or puls\$3)   | US-PGPUB;<br>USPAT;<br>USOCR;<br>FPRS;<br>EPO; JPO                         | OR               | ON      | 2007/01/02 13:36 |
| L6    | 10104  | ((concentric\$5 or coaxial\$5) with (pipe or tube or conduit or passage\$3)) and (valve or thrott\$3) and (acoustic\$5 or noise or sound or pulsation or puls\$3) and (exhaust or gas or gaseous or fluid)  | US-PGPUB;<br>USPAT;<br>USOCR;<br>FPRS;<br>EPO; JPO                         | OR               | ON      | 2007/01/02 13:53 |
| L7    | 5387   | 6 and (muffl\$5 or silenc\$5 or attenuat\$5 or suppress\$5 or damp\$5 or absorb\$5 or absorpt\$5)   | US-PGPUB;<br>USPAT;<br>USOCR;<br>FPRS;<br>EPO; JPO                         | OR               | ON      | 2007/01/02 13:54 |
| L9    | 1338   | 7 and (("181"/\$.ccls.) or ("180"/\$.ccls.) or ("123"/\$.ccls.) or ("138"/\$.ccls.) or ("137"/\$.ccls.) or ("60"/\$.ccls.))   | US-PGPUB;<br>USPAT;<br>USOCR;<br>FPRS;<br>EPO; JPO                         | OR               | ON      | 2007/01/02 13:55 |
| L13   | 3916   | ((concentric\$5 or coaxial\$5) with (pipe or tube or conduit or passage\$3)) same (valve or thrott\$3) and (acoustic\$5 or noise or sound or pulsation or puls\$3) and (exhaust or gas or gaseous or fluid) | US-PGPUB;<br>USPAT;<br>USOCR;<br>FPRS;<br>EPO; JPO                         | OR               | ON      | 2007/01/02 13:53 |
| L14   | 1814   | 13 and (muffl\$5 or silenc\$5 or attenuat\$5 or suppress\$5 or damp\$5 or absorb\$5 or absorpt\$5)  | US-PGPUB;<br>USPAT;<br>USOCR;<br>FPRS;<br>EPO; JPO                         | OR               | ON      | 2007/01/02 13:54 |
| L15   | 689    | 14 and (("181"/\$.ccls.) or ("180"/\$.ccls.) or ("123"/\$.ccls.) or ("138"/\$.ccls.) or ("137"/\$.ccls.) or ("60"/\$.ccls.))  | US-PGPUB;<br>USPAT;<br>USOCR;<br>FPRS;<br>EPO; JPO                         | OR               | ON      | 2007/01/02 13:54 |
| S1    | 837    | ((hiroyuki with ichikawa) or (sumito with mochizuki) or (takumi with okano) or (shinya with okuma)).in.   | US-PGPUB;<br>USPAT;<br>USOCR;<br>FPRS;<br>EPO; JPO;<br>DERWENT;<br>IBM_TDB | OR               | ON      | 2007/01/01 23:16 |

## EAST Search History

|    |    |  |  |    |    |                  |
|----|----|--|--|----|----|------------------|
| S2 | 97 | S1 and (muffl\$3 or silenc\$3 or exhaust or noise or acoustic\$5 or sound) | US-PGPUB;<br>USPAT;<br>USOCR;<br>FPRS;<br>EPO; JPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2007/01/01 23:34 |
|----|----|--|--|----|----|------------------|